

What is claimed is:

1. An electric power tool, comprising:

a drive device;

an output shaft transmitting a rotary power of said drive device;

5 a gear disposed on the output shaft with a space therefrom; and

a power transmission key composed of an elastic body and provided
between said output shaft and said gear,

wherein any one of a plane and a V-groove is formed on each of said
output shaft and said gear contacting said power transmission key.

10

2. The electric power tool according to claim 1, wherein said power transmission
key is made of high-strength plastic.

3. The electric power tool according to claim 1, wherein any one of a curvature
15 and a slope is provided on an abutting surface of said output shaft and said
power transmission key.

4. An electric power tool, comprising:

a drive device;

20 an output shaft transmitting a rotary power of the drive device, the output
shaft having at least one plane and a V-groove parallel to a center of the shaft;

a key composed of plastic, the key having a surface abutting against any
one of the plane and a side of the V-groove; and

a gear disposed on the output shaft with a space therefrom, the gear
25 having a groove abutting against the other surface of the key in a shaft hole

portion,

wherein power transmission is performed by said output shaft, said key and said gear, and said shaft contacts any one of the shaft hole portion of said gear and a member composed of metal during application of a large load.

5

5. The electric power tool according to claim 4, wherein the member contacting the shaft during the application of the large load is formed of a material having strength exceeding that of said plastic key.

10 6. The electric power tool according to claim 4, wherein the member composed of metal is inserted to the shaft hole portion.

7. The electric power tool according to claim 4, wherein said member composed of metal is formed integrally with said gear.

15